## **CLAIMS**

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## 1. A compound of formula (I)

or a pharmaceutically acceptable salt thereof in which:

X is selected from the group consisting of oxygen or NR<sup>2</sup>;

 $R^1$  is selected from the group consisting of H,  $C_{1-6}$ alkyl,  $C_{1-2}$ alkyl substituted by one to five fluorine atoms,  $C_{3-6}$ alkenyl,  $C_{3-6}$ alkynyl,  $C_{3-10}$ cycloalkyl $C_{0-6}$ alkyl,  $C_{4-12}$ bridged cycloalkyl,  $A(CR^5R^6)_n$  and  $B(CR^5R^6)_n$ ;

R<sup>2</sup> is selected from the group consisting of H and C<sub>1-6</sub>alkyl;

R<sup>3</sup> is C<sub>1-2</sub>alkyl substituted by one to five fluorine atoms;

R<sup>4</sup> is selected from the group consisting of C<sub>1-6</sub>alkyl, NH<sub>2</sub> and R<sup>8</sup>CONH;

R<sup>5</sup> and R<sup>6</sup> are independently selected from H or C<sub>1-6</sub>alkyl;

A is an unsubstituted 5- or 6-membered heteroaryl or an unsubstituted 6-membered aryl, or a 5- or 6-membered heteroaryl or a 6-membered aryl substituted by one or more R<sup>7</sup>:

 $R^7$  is selected from the group consisting of halogen,  $C_{1-6}$ alkyl,  $C_{1-6}$ alkyl substituted by one more fluorine atoms,  $C_{1-6}$ alkoxy,  $C_{1-6}$ alkoxy substituted by one or more F, NH<sub>2</sub>SO<sub>2</sub> and  $C_{1-6}$ alkylSO<sub>2</sub>;

B is selected from the group consisting of

defines the point of attachment of the ring;

 $R^8$  is selected from the group consisting of H,  $C_{1-6}$ alkyl,  $C_{1-6}$ alkyl

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 $_{6}$ alkylOCO,  $H_{2}$ NC $_{1-6}$ alkyl,  $C_{1-6}$ alkylOCONHC $_{1-6}$ alkyl and  $C_{1-6}$ alkylCONHC $_{1-6}$ alkyl; and n is 0 to 4.

## 2. A compound of formula (IA)

and pharmaceutically acceptable salts thereof in which:

R<sup>2</sup> is selected from the group consisting of H and C<sub>1-6</sub>alkyl;

 $R^4$  is selected from the group consisting of  $C_{1-6}$ alkyl,  $NH_2$  and  $R^8CONH$ ;  $R^5$  and  $R^6$  are independently selected from H or  $C_{1-6}$ alkyl;

R° and R° are independently selected from H or  $C_{1-6}$ alkyl;

A is C<sub>5-7</sub>cycloalkyl or an unsubstituted 5- or 6-membered heteroaryl or an unsubstituted 6-membered aryl, or a 5- or 6-membered heteroaryl or a 6-membered aryl substituted by one or more R<sup>7</sup>;

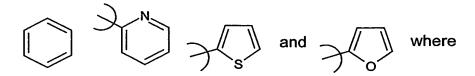
 $R^7$  is selected from the group consisting of halogen,  $C_{1-6}$ alkyl,  $C_{1-6}$ alkyl substituted by one more fluorine atoms,  $C_{1-6}$ alkoxy,  $C_{1-6}$ alkoxy substituted by one or more F, NH<sub>2</sub>SO<sub>2</sub> and  $C_{1-6}$ alkylSO<sub>2</sub>;

 $R^8$  is selected from the group consisting of H,  $C_{1\text{-}6}$  alkyl,  $C_{1\text{-}6}$  alkyl, and  $C_{1\text{-}6}$  alkyl, and

20 n is 0 to 4.

- 3. A compound as claimed in claim 1 or 2 wherein R<sup>2</sup> is H or methyl.
- 4. A compound as claimed in any of claims 1 to 3 wherein R<sup>4</sup> is C<sub>1-3</sub>alkyl.
- 5. A compound as claimed in any of claims 1 to 4 wherein R<sup>5</sup> and R<sup>6</sup> are both H.

6. A compound as claimed in any of claims 1 to 5 wherein A is selected from the group consisting of C<sub>5-7</sub>cycloalkyl or



- defines the point of attachment of the ring and A is unsubstituted or substituted by one or two R<sup>7</sup>.
- 5 7. A compound as claimed in any of claims 1 to 6 wherein R<sup>7</sup> is selected from the group consisting of halogen, C<sub>1-3</sub>alkyl, C<sub>1-3</sub>alkyl substituted by one to three fluorine atoms, and C<sub>1-3</sub>alkoxy.
  - 8. A compound as claimed in any of claims 1 to 7 wherein R<sup>8</sup> is selected from the group consisting of C<sub>1-6</sub>alkyl, phenyl and aminomethyl.
- 10 9. A compound as claimed in any of claims 1 to 8 wherein n is 0 to 2.
  - 10. A compound of formula (I) as defined in any of claims 1 to 9 and as described in Examples 1 to 13.
- [4-(5-Methanesulfonyl-pyridin-2-yl)-6-trifluoromethyl-pyrimidin-2-yl]-methyl (6-methyl-pyridin-2-ylmethyl)-amine;
   benzyl-[4-(5-methanesulfonyl-pyridin-2-yl)-6-trifluoromethyl-pyrimidin-2-yl] amine;
   cyclohexyl-[4-(5-methanesulfonyl-pyridin-2-yl)-6-trifluoromethyl-pyrimidin-2-yl]-amine.
- 20 12. A process for the preparation of a compound of formula (I) as defined in claim 1, which comprises:
  - (A), reacting a compound R<sup>1</sup>XH of formula (II) or a protected derivative thereof with a compound of formula (III)

$$R^4O_2S$$
 $N$ 
 $SO_2$ alkyl
(III)

and thereafter and if necessary,

- (B), interconverting a compound of formula (I) into another compound of formula (I); and/or
- 5 (C), deprotecting a protected derivative of compound of formula (I).
  - 13. A process for the preparation of a compound of formula (IA) as defined in claim 2, which comprises:
    - (A) reacting an amine HNR<sup>2</sup>(CR<sup>5</sup>R<sup>6</sup>)<sub>n</sub>A of formula (IIA) or a protected derivative thereof with a compound of formula (III) wherein R<sup>3</sup> is CF<sub>3</sub>

$$\mathbb{R}^4 O_2 S$$
 $\mathbb{N}$ 
 $\mathbb{N}$ 

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and thereafter and if necessary,

- (B), interconverting a compound of formula (I) into another compound of formula (I); and/or
- (C), deprotecting a protected derivative of compound of formula (I).
- 14. A pharmaceutical composition comprising a compound of formula (I) or (IA) as defined in any one of claims 1 to 11 in admixture with one or more physiologically acceptable carriers or excipients.
  - 15. A compound of formula (I) or (IA) as defined in any one of claims 1 to 11 for use in human or veterinary medicine.

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- 16. A method of treating a human or animal subject suffering from a condition which is mediated by COX-2 which comprises administering to said subject an effective amount of a compound of formula (I) or (IA) as defined in any one of claims 1 to 11.
- 17. A method of treating a human or animal subject suffering from an inflammatory disorder, which method comprises administering to said subject an effective amount of a compound of formula (I) or (IA) as defined in any one of claims 1 to 11.
  - 18. The use of a compound of formula (I) or (IA) as defined in any one of claims 1 to 11 for the manufacture of a therapeutic agent for the treatment of a condition which is mediated by COX-2.
    - 19. The use of a compound of formula (I) or (IA) as defined in any one of claims 1 to 11 for the manufacture of a therapeutic agent for the treatment of an inflammatory disorder.